

## ABSTRACT OF THE DISCLOSURE

A method is disclosed for carrying out network device provisioning and configuration, and communication of other information to a network device, automatically and in an assured manner. A configuration service receives a request from a network device to provide

5 configuration information. The configuration service retrieves a template representing the configuration from a storage location, e.g., a directory service. The configuration service also retrieves one or more parameter values specific to the device. Device-specific values are instantiated for the generic parameters in the template, based on the retrieved values. The resulting configuration is stored in XML format using XML tags to delimit configuration

10 commands, tested for well-formed-ness, and syntax checked. A reliable transport protocol carries the configuration information to the device. At the device, a configuration agent syntax checks the embedded configuration information, and then applies the configuration information to the device. As a result, automatic network provisioning may be accomplished remotely, without requiring a skilled technician to visit customer premises to carry out

15 configuration. The process may be integrated with an event service to enable multiple devices to concurrently receive re-configuration without special synchronization logic.